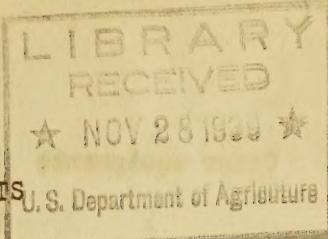


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USE AND PREPARATION OF CHARTS

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The purpose of this paper is to explain some uses that might be made of charts in presenting educational materials in Extension meetings and to present a method of making charts.

USE

Visual instruction is considered one of the most important methods of getting educational materials across to audiences. By the use of charts certain kinds of materials may be presented. Type of data and the size of audience are important factors to consider in deciding whether to use charts. One of the most important advantages of charts, if properly prepared, is the large amount of information that can be presented in the minimum amount of time.

We have received considerable comments from county agents and others objecting to the use of charts. I believe one of the primary reasons agents object to charts is because of the way they have been prepared and the attempting to show by means of charts data which could have been presented better otherwise. Probably the greatest criticism that can be made of charts is that too much material is shown on the chart. Often it may be better to make two or three charts rather than put so much information on one chart. Probably another just criticism is the method of presenting charts. Research on the amount of time necessary to properly explain a chart shows that at least five minutes is needed for each chart. For a meeting which lasts 20 to 30 minutes, four or six charts should be the maximum number used.

PREPARATION OF CHARTS

Materials: The following materials are used in making charts:

Chart cloth: This is known as 36" Ad Poster sign cloth. It may be obtained from the Western Shade Cloth Company which has an office in Atlanta. The cloth comes in 60-yard rolls, is 36" wide, and average cost for the last few years has been approximately 11 cents per yard.

Ink: Higgins' American India Ink is considered good. There are also other good inks.

Pens: The pens which have been found most satisfactory are Goit's Ball-bearing Lettering Pens. These pens come in four sizes: 1/2", 2/3", 1/4" and 3/16". They are made by the Bridgeport Pen Company, Bridgeport, Connecticut, and cost about 35 cents each.

Drafting table: It is advisable to have a drafting table, but if one cannot be obtained, any smooth top table or desk may be used in making charts. It will be necessary to pin or fasten corners of chart so they will not slip and preferably two sides of the desk should be straight edged so T-square can be used in making lines.

Other equipment:	36" T-square	Large shears
	Foot rule	Yardstick
	Metric Triangular Scale	Paste
	Triangles (30 - 60)	Opaque White Paint

Size of charts: One of the most distracting things imaginable is the attempting to use a number of different size charts at a meeting. It is impossible to arrange them so that edges of one chart won't be showing while another chart is being used and it is also impossible to handle them without making a lot of noise. Experience shows that two sizes of charts: one 36" x 57" and the other 36" x 108" are adequate for practically any kind of data. Probably the 36" x 57" with the data running the short way so the chart will hang the long way is the most convenient under most conditions. The longer chart may be used where it is advisable to run data the long way, hanging the chart the short way. If the two kinds of charts are to be shown, it is advisable to have them on separate stands and then use only one set of charts at a time, and not shift back and forth from small charts to large charts.

Size of Lettering: Letters $2\frac{1}{2}$ " high are used in titles of charts. Letters in sub-titles or headings are 1-3/4" to 2" and letters in body of chart are 1-1/2" to 1-3/4" high. Spaces between lines are from 1" to 2", depending on amount of materials to go on the chart.

Suggestions on Making Charts: 1. Insist that the draftsmen use a vertical simple style of lettering without flourishes. This gives speed and accuracy in drafting, and results in a chart that can be read easily.

2. Make titles and headings short and easy to read and understand.
3. Graphs should show as few lines as possible.

Cost of Making Chart: Cost of making charts will depend somewhat on variation of price of materials and the price of labor. Ordinarily, the materials for a chart should not cost over 25 to 30 cents and the labor probably not over 40 to 50 cents. Most charts should be made in from an hour to one and one-half hours.

Equipment Used in Showing Charts: The standard and extension shown in Figure 1 is recommended in showing charts. The extension rod shown here can be made at a blacksmith or engineering shop. Mounting sticks can be made in your own shop or get some carpenter to make them and they are made of cypress wood or other soft wood, $3\frac{1}{2}$ $4\frac{1}{2}$ " long by 1" x 1", with 4 holes for bolts, 1" and 6" in from each end. Bolts and wing nuts are used for fastening the mounting sticks together. The bolts are $2\frac{1}{2}$ " x 1/4" with round heads and square shoulders.

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FIGURE 1. CHART STANDARD WITH EXTENSION AND CROSS ARM FOR SHOWING CHARTS.

